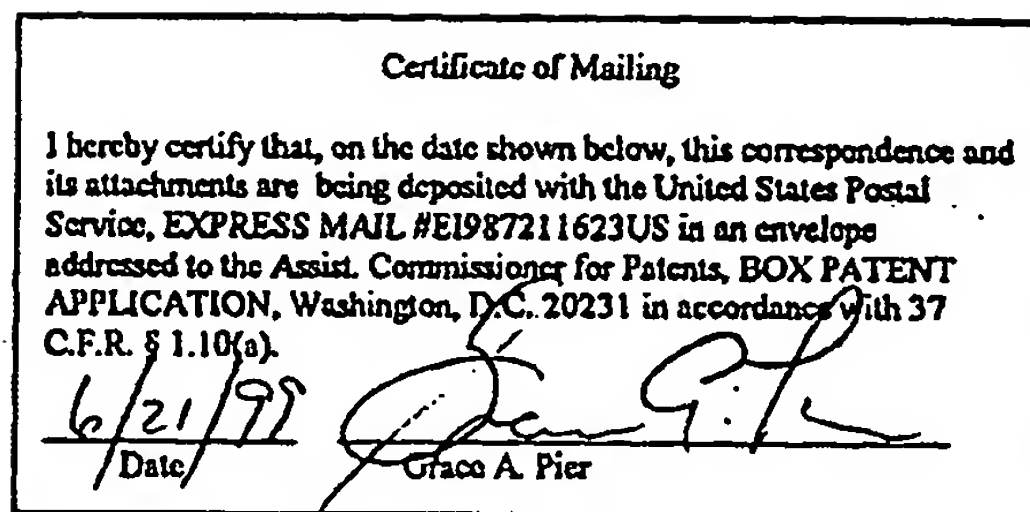


10/628,145



## APPLICATION FOR PATENT

INVENTOR(S): MARC GONIN

TITLE: A MULTI-ANODE DETECTOR WITH INCREASED DYNAMIC RANGE FOR TIME-OF-FLIGHT MASS SPECTROMETERS WITH COUNTING DATA ACQUISITION

This appl is a con of 09/720,182 Pat 6,646,252  
which is a 371 of PCT/US99/13565 06/21/99  
SPECIFICATION

### BACKGROUND OF THE INVENTION

#### 1. Field of the Invention

5 The present invention is useful in time-of-flight mass spectrometry (TOFMS),  
a method for qualitative and quantitative chemical analysis. Many TOFMS work with  
counting techniques, in which case the dynamic range of the analysis is strongly  
limited by the measuring time and the cycle repetition rate. This invention describes  
10 a detection method to increase the dynamic range of elemental-, isotopic-, or  
molecular analysis with counting techniques.